

C L A I M S

1. A method for obtaining first information about a nucleic acid of an individual subject to a specific disease, and second information about a nucleic acid
5 from a pathogenic microorganism present in said individual wherein said pathogenic organism is associated with the specific disease, comprising:

(a) reacting an extract of nucleic acid from the individual with a probe-immobilized substrate
10 comprising a first probe and a second probe, wherein said first probe detects the presence of a specific nucleic acid sequence of the pathogenic microorganism, wherein said pathogenic microorganism is associated with said specific disease, and wherein said second
15 probe detects the presence of a specific nucleic acid sequence of said individual; and

(b) obtaining said first information by detecting the presence of nucleic acid bound to said first probe, if any, and obtaining said second information by
20 detecting the presence of nucleic acid bound to said second probe, if any, resulting from said reaction of (a).

2. The method according to claim 1, wherein said nucleic acid of said individual is associated with
25 responsiveness to a treatment for the disease, and wherein the presence of both said nucleic acid from said pathogenic microorganism and said nucleic acid

from said individual is correlated with responsiveness to a treatment for the disease.

3. The method of claim 1, further comprising
subjecting said extract of nucleic acid from said
5 individual to amplification to obtain amplified nucleic
acids prior to reacting in (a).

4. The method according to claim 1, wherein said
individual is a human.

5. The method according to claim 1, wherein said
10 extract of nucleic acid is prepared from whole blood.

6. The method according to claim 5, wherein said
nucleic acid from an individual is a human genomic
nucleic acid; and said nucleic acid from said
pathogenic microorganism is a genomic nucleic acid.

7. The method according to claim 1, wherein said
15 nucleic acid from said individual is human genomic
nucleic acid, said nucleic acid from said pathogenic
microorganism is RNA; and prior to reacting in (a) a
reverse transcription reaction is performed.

8. The method according to claim 3, wherein said
20 nucleic acid from said individual is a human genomic
nucleic acid, said nucleic acid from said pathogenic
microorganism is RNA; and prior to amplification, a
reverse transcription reaction is performed.

9. The method according to claim 6, wherein said
25 extract of nucleic acid is obtained by a human genome
extraction kit.

10. The method according to claim 9, wherein said human genome extraction kit is QIAamp DNA Blood Midi Kit.

11. The method according to claim 1, wherein said specific disease is hepatitis and said pathogenic microorganism is hepatitis virus.

12. The method according to claim 3, wherein said specific disease is hepatitis and said pathogenic microorganism is hepatitis virus.

13. The method according to claim 11, wherein said first probe detects a genotype of hepatitis C virus and said second probe detects a SNP of the MxA promoter region.

14. The method according to claim 11, wherein said first probe detects a genotype of hepatitis C virus and said second probe detects a polymorphism of the MBL gene.

15. The method according to claim 11, wherein said first probe comprises at least one type of base sequence selected from the group consisting of:

(a) a base sequence selected from the group consisting of base sequences represented by SEQ ID NO:1, 2, 3 and 5;

(b) a base sequence selected from the group consisting of base sequences represented by SEQ ID NO:5, 6, and 7; and

(c) a complementary sequence to a base sequence

selected from (a) and (b), and

said second probe comprises at least one type of
base sequence selected from the group consisting of:

(at455) a base sequence represented by SEQ ID
5 NO:16 of the list attached;

(bt455) a modified base sequence obtained by
modifying the sequence represented by (at455) by
deleting or substituting several bases except for the
base of the 455th position or adding at least one base
10 thereto;

(ct455) a base sequence containing bases of the
441st to 455th positions of the sequence represented by
SEQ ID NO:16;

(dt455) a base sequence containing bases of the
15 449th to 459th positions of the sequence represented by
SEQ ID NO:16;

(et455) a complementary sequence to a base
sequence selected from the base sequences of (at455) to
(dt455);

(ag455) a base sequence represented by SEQ ID
20 NO:17 of the list;

(bg455) a modified base sequence obtained by
modifying the sequence represented by (ag455) by
deleting or substituting several bases except for the
base of the 455th position or adding at least one base
25 thereto;

(cg455) a base sequence containing bases of the

441st to 455th positions of the sequence represented by
SEQ ID NO:17;

(dg455) a base sequence containing bases of the
449th to 459th positions of the sequence represented by
5 SEQ ID NO:17;

(eg455) a complementary sequence to a base
sequence selected from the base sequences of (ag455) to
(dg455);

(aa455) a base sequence represented by SEQ ID
10 NO:18 of the list;

(ba455) a modified base sequence obtained by
modifying the sequence represented by (aa455) by
deleting or substituting several bases except for the
base of the 455th position or adding at least one base
15 thereto;

(ca455) a base sequence containing bases of the
441st to 455th positions of the sequence represented by
SEQ ID NO:18;

(da455) a base sequence containing bases of the
20 449th to 459th positions of the sequence represented by
SEQ ID NO:18;

(ea455) a complementary sequence to a base
sequence selected from the base sequences of (aa455) to
(da455);

(ac455) a base sequence represented by SEQ ID
25 NO:19 of the list;

(bc455) a modified base sequence obtained by

modifying the sequence represented by (ac455) by deleting or substituting several bases except for the base of the 455th position or adding at least one base thereto;

5 (cc455) a base sequence containing bases of the 441st to 455th positions of the sequence represented by SEQ ID NO:19;

 (dc455) a base sequence containing bases of the 449th to 459th positions of the sequence represented by
10 SEQ ID NO:19;

 (ec455) a complementary sequence to a base sequence selected from the base sequences of (ac455) to (dc455);

 (aa420) a base sequence represented by SEQ ID
15 NO:37 of the list attached;

 (ba420) a modified base sequence obtained by modifying the sequence represented by (aa420) by deleting or substituting several bases except for the base of the 420th position or adding at least one base
20 thereto;

 (ca420) a base sequence containing bases of the 415th to 425th positions of the sequence represented by SEQ ID NO:37;

 (da420) a complementary sequence to a base
25 sequence selected from the base sequences of (aa420) to (ca420);

 (ac420) a base sequence represented by SEQ ID

NO:38 of the list;

(bc420) a modified base sequence obtained by modifying the sequence represented by (ac420) by deleting or substituting several bases except for the
5 base of the 420th position or adding at least one base thereto;

(cc420) a base sequence containing bases of the 415th to 425th positions of the sequence represented by SEQ ID NO:38;

10 (dc420) a complementary sequence to a base sequence selected from the base sequences of (ac420) to (cc420);

(at420) a base sequence represented by SEQ ID NO:39 of the list;

15 (bt420) a modified base sequence obtained by modifying the sequence represented by (at420) by deleting or substituting several bases except for the base of the 420th position or adding at least one base thereto;

20 (ct420) a base sequence containing bases of the 415th to 425th positions of the sequence represented by SEQ ID NO:39;

(dt420) a complementary sequence to a base sequence selected from the base sequences of (at420) to
25 (ct420);

(ag420) a base sequence represented by SEQ ID NO:40 of the list attached at a later portion in the

text;

(bg420) a modified base sequence obtained by
modifying the sequence represented by (ag420) by
deleting or substituting several bases except for the
5 base of the 420th position or adding at least one base
thereto;

(cg420) a base sequence containing bases of the
415th to 425th positions of the sequence represented by
SEQ ID NO:40;

10 (dg420) a complementary sequence to a base
sequence selected from the base sequences of (ag420) to
(cg420);

(ag221) a base sequence represented by SEQ ID
NO:41 of the list attached at a later portion in the
15 text;

(bg221) a modified base sequence obtained by
modifying the sequence represented by (ag221) by
deleting or substituting several bases except for the
base of the 425th position or adding at least one base
20 thereto;

(cg221) a base sequence containing bases of the
418th to 432nd positions of the sequence represented by
SEQ ID NO:41;

(dg221) a base sequence containing bases of the
25 421st to 430th positions of the sequence represented by
SEQ ID NO:41;

(eg221) a complementary sequence to a base

sequence selected from the base sequences of (ag221) to (dg221);

5 (ac221) a base sequence represented by SEQ ID NO:42 of the list attached at a later portion in the text;

(bc221) a modified base sequence obtained by modifying the sequence represented by (ac221) by deleting or substituting several bases except for the base of the 425th position or adding at least one base thereto;

10

(cc221) a base sequence containing bases of the 418th to 432nd positions of the sequence represented by SEQ ID NO:42;

(dc221) a base sequence containing bases of the 421st to 430th positions of the sequence represented by SEQ ID NO:42;

15

(ec221) a complementary sequence to a base sequence selected from the base sequences of (ac221) to (dc221);

20 (aa221) a base sequence represented by SEQ ID NO:43 of the list attached at a later portion in the text;

(ba221) a modified base sequence obtained by modifying the sequence represented by (aa221) by deleting or substituting several bases except for the base of the 425th position or adding at least one base thereto;

25

(ca221) a base sequence containing bases of the 418th to 432nd positions of the sequence represented by SEQ ID NO:43;

5 (da221) a base sequence containing bases of the 421st to 430th positions of the sequence represented by SEQ ID NO: 43;

(ea221) a complementary sequence to a base sequence selected from the base sequences of (aa221) to (da221);

10 (at21) a base sequence represented by SEQ ID NO: 44 of the list attached at a later portion in the text;

(bt221) a modified base sequence obtained by modifying the sequence represented by (at221) by
15 deleting or substituting several bases except for the base of the 425th position or adding at least one base thereto;

(ct221) a base sequence containing bases of the 418th to 432nd positions of the sequence represented by
20 SEQ ID NO:44;

(dt221) a base sequence containing bases of the 421st to 430th positions of the sequence represented by SEQ ID NO:44;

(et221) a complementary sequence to a base
25 sequence selected from the base sequences of (at221) to (dt221);

(ag54) a base sequence represented by SEQ ID

NO: 45 of the list attached at a later portion in the text;

(bg54) a modified base sequence obtained by modifying the sequence represented by (ag54) by
5 deleting or substituting several bases except for the base of the 875th position or adding at least one base thereto;

(cg54) a base sequence containing bases of the 874th to 876th positions of the sequence represented by
10 SEQ ID NO: 45;

(dg54) a base sequence containing bases of the 869th to 880th positions of the sequence represented by SEQ ID NO: 45;

(eg54) a complementary sequence to a base sequence
15 selected from the base sequences of (ag54) to (dg54);

(aa54) a base sequence represented by SEQ ID NO: 46 of the list attached at a later portion in the text;

(ba54) a modified base sequence obtained by
20 modifying the sequence represented by (aa54) by deleting or substituting several bases except for the base of the 875th position or adding at least one base thereto;

(ca54) a base sequence containing bases of the 874th to 876th positions of the sequence represented by
25 SEQ ID NO: 46;

(da54) a base sequence containing bases of the

869th to 880th positions of the sequence represented by
SEQ ID NO: 46;

(ea54) a complementary sequence to a base sequence
selected from the base sequences of (aa54) to (da54);

5 (ac54) a base sequence represented by SEQ ID
NO: 47 of the list attached at a later portion in
the text;

(bc54) a modified base sequence obtained by
modifying the sequence represented by (ac54) by
10 deleting or substituting several bases except for the
base of the 875th position or adding at least one base
thereto;

(cc54) a base sequence containing bases of the
874th to 876th positions of the sequence represented by
15 SEQ ID NO: 47;

(dc54) a base sequence containing bases of the
869th to 880th positions of the sequence represented by
SEQ ID NO: 47;

(ec54) a complementary sequence to a base sequence
20 selected from the base sequences of (ac54) to (dc54);

(at54) a base sequence represented by SEQ ID
NO: 48 of the list attached at a later portion in
the text;

(bt54) a modified base sequence obtained by
25 modifying the sequence represented by (ag54) by
deleting or substituting several bases except for the
base of the 875th position or adding at least one base

thereto;

(ct54) a base sequence containing bases of the 874th to 876th positions of the sequence represented by SEQ ID NO:48;

5 (dt54) a base sequence containing bases of the 869th to 880th positions of the sequence represented by SEQ ID NO:48;

(et54) a complementary sequence to a base sequence selected from the base sequences of (at54) to (dt54);

10 (ag52-57) a base sequence represented by SEQ ID NO:45 of the list attached at a later portion in the text;

(bg52-57) a modified base sequence obtained by modifying the sequence represented by (ag52-57) by
15 deleting or substituting several bases except for the base of the 875th position or adding at least one base thereto;

(cg52-57) a base sequence containing bases of the 868th to 885th positions of the sequence represented by
20 SEQ ID NO:45;

(dg52-57) a complementary sequence to a base sequence selected from the base sequences of (ag52-57) to (dg52-57);

(aa52-57) a base sequence represented by SEQ ID
25 NO:46 of the list attached at a later portion in the text;

(ba52-57) a modified base sequence obtained by

modifying the sequence represented by (aa52-57) by deleting or substituting several bases except for the base of the 875th position or adding at least one base thereto;

5 (ca52-57) a base sequence containing bases of the 868th to 885th positions of the sequence represented by SEQ ID NO:46;

 (da52-57) a complementary sequence to a base sequence selected from the base sequences of (aa52-57) to (ca52-57);

10

 (ac52-57) a base sequence represented by SEQ ID NO:47 of the list attached at a later portion in the text;

 (bc52-57) a modified base sequence obtained by modifying the sequence represented by (ac52-57) by deleting or substituting several bases except for the base of the 875th position or adding at least one base thereto;

15

 (cc52-57) a base sequence containing bases of the 868th to 885th positions of the sequence represented by SEQ ID NO:47;

20

 (dc52-57) a complementary sequence to a base sequence selected from the base sequences of (ac52-57) to (cc52-57);

25 (at52-57) a base sequence represented by SEQ ID NO:48 of the list attached at a later portion in the text;

(bt52-57) a modified base sequence obtained by modifying the sequence represented by (at52-57) by deleting or substituting several bases except for the base of the 875th position or adding at least one base thereto;

(ct52-57) a base sequence containing bases of the 868th to 885th positions of the sequence represented by SEQ ID NO:48; and

(dt52-57) a complementary sequence to a base sequence selected from the base sequences of (at52-57) to (dt52-57).

16. A method according to claim 12, wherein said first probe comprises at least one type of base sequence selected from the group consisting of:

(a) a base sequence selected from the group consisting of base sequences represented by SEQ ID NO:1, 2, 3 and 5;

(b) a base sequence selected from the group consisting of base sequences represented by SEQ ID NO:5, 6, and 7; and

(c) a complementary sequence to a base sequence selected from (a) and (b), and

said second probe comprises at least one type of base sequence selected from the group consisting of:

(at455) a base sequence represented by SEQ ID NO:16 of the list attached;

(bt455) a modified base sequence obtained by

modifying the sequence represented by (at455) by deleting or substituting several bases except for the base of the 455th position or adding at least one base thereto;

5 (ct455) a base sequence containing bases of the 441st to 455th positions of the sequence represented by SEQ ID NO:16;

 (dt455) a base sequence containing bases of the 449th to 459th positions of the sequence represented by
10 SEQ ID NO:16;

 (et455) a complementary sequence to a base sequence selected from the base sequences of (at455) to (dt455);

 (ag455) a base sequence represented by SEQ ID
15 NO:17 of the list;

 (bg455) a modified base sequence obtained by modifying the sequence represented by (ag455) by deleting or substituting several bases except for the base of the 455th position or adding at least one base
20 thereto;

 (cg455) a base sequence containing bases of the 441st to 455th positions of the sequence represented by SEQ ID NO:17;

 (dg455) a base sequence containing bases of the
25 449th to 459th positions of the sequence represented by SEQ ID NO:17;

 (eg455) a complementary sequence to a base

sequence selected from the base sequences of (ag455) to (dg455);

(aa455) a base sequence represented by SEQ ID NO:18 of the list;

5 (ba455) a modified base sequence obtained by modifying the sequence represented by (aa455) by deleting or substituting several bases except for the base of the 455th position or adding at least one base thereto;

10 (ca455) a base sequence containing bases of the 441st to 455th positions of the sequence represented by SEQ ID NO:18;

(da455) a base sequence containing bases of the 449th to 459th positions of the sequence represented by
15 SEQ ID NO:18;

(ea455) a complementary sequence to a base sequence selected from the base sequences of (aa455) to (da455);

(ac455) a base sequence represented by SEQ ID
20 NO:19 of the list;

(bc455) a modified base sequence obtained by modifying the sequence represented by (ac455) by deleting or substituting several bases except for the base of the 455th position or adding at least one base
25 thereto;

(cc455) a base sequence containing bases of the 441st to 455th positions of the sequence represented by

SEQ ID NO:19;

(dc455) a base sequence containing bases of the 449th to 459th positions of the sequence represented by SEQ ID NO:19;

5 (ec455) a complementary sequence to a base sequence selected from the base sequences of (ac455) to (dc455);

(aa420) a base sequence represented by SEQ ID NO:37 of the list attached;

10 (ba420) a modified base sequence obtained by modifying the sequence represented by (aa420) by deleting or substituting several bases except for the base of the 420th position or adding at least one base thereto;

15 (ca420) a base sequence containing bases of the 415th to 425th positions of the sequence represented by SEQ ID NO:37;

(da420) a complementary sequence to a base sequence selected from the base sequences of (aa420) to (ca420);

20

(ac420) a base sequence represented by SEQ ID NO:38 of the list;

(bc420) a modified base sequence obtained by modifying the sequence represented by (ac420) by deleting or substituting several bases except for the base of the 420th position or adding at least one base thereto;

25

(cc420) a base sequence containing bases of the 415th to 425th positions of the sequence represented by SEQ ID NO:38;

5 (dc420) a complementary sequence to a base sequence selected from the base sequences of (ac420) to (cc420);

(at420) a base sequence represented by SEQ ID NO:39 of the list;

10 (bt420) a modified base sequence obtained by modifying the sequence represented by (at420) by deleting or substituting several bases except for the base of the 420th position or adding at least one base thereto;

15 (ct420) a base sequence containing bases of the 415th to 425th positions of the sequence represented by SEQ ID NO:39;

(dt420) a complementary sequence to a base sequence selected from the base sequences of (at420) to (ct420);

20 (ag420) a base sequence represented by SEQ ID NO:40 of the list attached at a later portion in the text;

25 (bg420) a modified base sequence obtained by modifying the sequence represented by (ag420) by deleting or substituting several bases except for the base of the 420th position or adding at least one base thereto;

(cg420) a base sequence containing bases of the 415th to 425th positions of the sequence represented by SEQ ID NO:40;

5 (dg420) a complementary sequence to a base sequence selected from the base sequences of (ag420) to (cg420);

(ag221) a base sequence represented by SEQ ID NO:41 of the list attached at a later portion in the text;

10 (bg221) a modified base sequence obtained by modifying the sequence represented by (ag221) by deleting or substituting several bases except for the base of the 425th position or adding at least one base thereto;

15 (cg221) a base sequence containing bases of the 418th to 432nd positions of the sequence represented by SEQ ID NO:41;

(dg221) a base sequence containing bases of the 421st to 430th positions of the sequence represented by
20 SEQ ID NO:41;

(eg221) a complementary sequence to a base sequence selected from the base sequences of (ag221) to (dg221);

(ac221) a base sequence represented by SEQ ID
25 NO:42 of the list attached at a later portion in the text;

(bc221) a modified base sequence obtained by

modifying the sequence represented by (ac221) by deleting or substituting several bases except for the base of the 425th position or adding at least one base thereto;

5 (cc221) a base sequence containing bases of the 418th to 432nd positions of the sequence represented by SEQ ID NO:42;

 (dc221) a base sequence containing bases of the 421st to 430th positions of the sequence represented by
10 SEQ ID NO:42;

 (ec221) a complementary sequence to a base sequence selected from the base sequences of (ac221) to (dc221);

 (aa221) a base sequence represented by SEQ ID
15 NO:43 of the list attached at a later portion in the text;

 (ba221) a modified base sequence obtained by modifying the sequence represented by (aa221) by deleting or substituting several bases except for the
20 base of the 425th position or adding at least one base thereto;

 (ca221) a base sequence containing bases of the 418th to 432nd positions of the sequence represented by SEQ ID NO:43;

25 (da221) a base sequence containing bases of the 421st to 430th positions of the sequence represented by SEQ ID NO:43;

(ea221) a complementary sequence to a base sequence selected from the base sequences of (aa221) to (da221);

5 (at21) a base sequence represented by SEQ ID NO: 44 of the list attached at a later portion in the text;

(bt221) a modified base sequence obtained by modifying the sequence represented by (at221) by deleting or substituting several bases except for the
10 base of the 425th position or adding at least one base thereto;

(ct221) a base sequence containing bases of the 418th to 432nd positions of the sequence represented by SEQ ID NO:44;

15 (dt221) a base sequence containing bases of the 421st to 430th positions of the sequence represented by SEQ ID NO:44;

(et221) a complementary sequence to a base sequence selected from the base sequences of (at221) to
20 (dt221);

(ag54) a base sequence represented by SEQ ID NO:45 of the list attached at a later portion in the text;

(bg54) a modified base sequence obtained by
25 modifying the sequence represented by (ag54) by deleting or substituting several bases except for the base of the 875th position or adding at least one base

thereto;

(cg54) a base sequence containing bases of the 874th to 876th positions of the sequence represented by SEQ ID NO:45;

5 (dg54) a base sequence containing bases of the 869th to 880th positions of the sequence represented by SEQ ID NO:45;

(eg54) a complementary sequence to a base sequence selected from the base sequences of (ag54) to (dg54);

10 (aa54) a base sequence represented by SEQ ID NO: 46 of the list attached at a later portion in the text;

(ba54) a modified base sequence obtained by modifying the sequence represented by (aa54) by
15 deleting or substituting several bases except for the base of the 875th position or adding at least one base thereto;

(ca54) a base sequence containing bases of the 874th to 876th positions of the sequence represented by
20 SEQ ID NO:46;

(da54) a base sequence containing bases of the 869th to 880th positions of the sequence represented by SEQ ID NO:6;

(ea54) a complementary sequence to a base sequence
25 selected from the base sequences of (aa54) to (da54);

(ac54) a base sequence represented by SEQ ID NO: 47 of the list attached at a later portion in

the text;

(bc54) a modified base sequence obtained by modifying the sequence represented by (ac54) by deleting or substituting several bases except for the
5 base of the 875th position or adding at least one base thereto;

(cc54) a base sequence containing bases of the 874th to 876th positions of the sequence represented by SEQ ID NO:47;

10 (dc54) a base sequence containing bases of the 869th to 880th positions of the sequence represented by SEQ ID NO:47;

(ec54) a complementary sequence to a base sequence selected from the base sequences of (ac54) to (dc54);

15 (at54) a base sequence represented by SEQ ID NO: 48 of the list attached at a later portion in the text;

(bt54) a modified base sequence obtained by modifying the sequence represented by (ag54) by
20 deleting or substituting several bases except for the base of the 875th position or adding at least one base thereto;

(ct54) a base sequence containing bases of the 874th to 876th positions of the sequence represented by
25 SEQ ID NO:48;

(dt54) a base sequence containing bases of the 869th to 880th positions of the sequence represented by

SEQ ID NO:48;

(et54) a complementary sequence to a base sequence selected from the base sequences of (at54) to (dt54);

5 (ag52-57) a base sequence represented by SEQ ID NO:45 of the list attached at a later portion in the text;

(bg52-57) a modified base sequence obtained by modifying the sequence represented by (ag52-57) by deleting or substituting several bases except for the
10 base of the 875th position or adding at least one base thereto;

(cg52-57) a base sequence containing bases of the 868th to 885th positions of the sequence represented by SEQ ID NO:45;

15 (dg52-57) a complementary sequence to a base sequence selected from the base sequences of (ag52-57) to (dg52-57);

(aa52-57) a base sequence represented by SEQ ID NO:46 of the list attached at a later portion in the
20 text;

(ba52-57) a modified base sequence obtained by modifying the sequence represented by (aa52-57) by deleting or substituting several bases except for the
25 base of the 875th position or adding at least one base thereto;

(ca52-57) a base sequence containing bases of the 868th to 885th positions of the sequence represented by

SEQ ID NO:46;

(da52-57) a complementary sequence to a base sequence selected from the base sequences of (aa52-57) to (ca52-57);

5 (ac52-57) a base sequence represented by SEQ ID NO:47 of the list attached at a later portion in the text;

(bc52-57) a modified base sequence obtained by modifying the sequence represented by (ac52-57) by
10 deleting or substituting several bases except for the base of the 875th position or adding at least one base thereto;

(cc52-57) a base sequence containing bases of the 868th to 885th positions of the sequence represented by
15 SEQ ID NO:47;

(dc52-57) a complementary sequence to a base sequence selected from the base sequences of (ac52-57) to (cc52-57);

(at52-57) a base sequence represented by SEQ ID
20 NO:48 of the list attached at a later portion in the text;

(bt52-57) a modified base sequence obtained by modifying the sequence represented by (at52-57) by deleting or substituting several bases except for the
25 base of the 875th position or adding at least one base thereto;

(ct52-57) a base sequence containing bases of the

868th to 885th positions of the sequence represented by
SEQ ID NO:48; and

(dt52-57) a complementary sequence to a base
sequence selected from the base sequences of (at52-57)
5 to (dt52-57).

17. The method according to claim 12, wherein said
amplification is performed by a PCR using a sense
strand represented by at least one base sequence
selected from the group consisting of sequences
10 represented by SEQ ID NO:8 and 9, and an anti-sense
strand represented by at least one base sequence
selected from the group consisting of sequences
represented by SEQ ID NO:10, 11, 12, 13 and 14.

18. A probe-immobilized substrate, comprising:
15 a substrate
a first probe immobilized on the substrate for
detecting the presence of a specific nucleic acid of a
pathogenic microorganism, if any, wherein said
microorganism is associated with a specific disease;
20 and

a second probe immobilized on the substrate and
having a different base sequence from that of the first
probe, for detecting the presence of a specific nucleic
acid of an individual, if any, wherein said nucleic
25 acid of said individual is associated with
responsiveness to a treatment for the disease.

19. The probe-immobilized substrate of claim 18,

wherein said pathogenic microorganism is hepatitis C virus and said medicinal agent is IFN.

20. The probe-immobilized substrate of claim 18,
wherein said nucleic acid of the individual is the
5 promoter region of MxA.

21. The probe-immobilized substrate of claim 18,
wherein said nucleic acid of the individual is the gene
encoding MBL.

22 The probe-immobilized substrate of claim 18,
10 wherein said first probe detects a genotype of
hepatitis C virus.

23. A probe-immobilized substrate comprising:
a substrate
a first probe comprising at least one sequence
15 selected from the group consisting of

(a) a base sequence selected from the group
consisting of base sequences represented by SEQ ID
NO:1, 2, 3 and 5;

(b) a base sequence selected from the group
20 consisting of base sequences represented by SEQ ID
NO:5, 6, and 7; and

(c) a complementary sequence to a base sequence
selected from (a) and (b), and

a second probe immobilized on the substrate and
25 comprising at least one sequence selected from the
group consisting of:

(at455) a base sequence represented by SEQ ID

NO:16;

(bt455) a modified base sequence obtained by
modifying the sequence represented by (at455) by
deleting or substituting several bases except for the
5 base of the 455th position or adding at least one base
thereto;

(ct455) a base sequence containing bases of the
441st to 455th positions of the sequence represented by
SEQ ID NO:16;

10 (dt455) a base sequence containing bases of the
449th to 459th positions of the sequence represented by
SEQ ID NO:16;

(et455) a complementary sequence to a base
sequence selected from the base sequences of (at455) to
15 (dt455);

(ag455) a base sequence represented by SEQ ID
NO:17;

(bg455) a modified base sequence obtained by
modifying the sequence represented by (ag455) by
20 deleting or substituting several bases except for the
base of the 455th position or adding at least one base
thereto;

(cg455) a base sequence containing bases of the
441st to 455th positions of the sequence represented by
25 SEQ ID NO:17;

(dg455) a base sequence containing bases of the
449th to 459th positions of the sequence represented by

SEQ ID NO:17;

(eg455) a complementary sequence to a base sequence selected from the base sequences of (ag455) to (dg455);

5 (aa455) a base sequence represented by SEQ ID NO:18\;

(ba455) a modified base sequence obtained by modifying the sequence represented by (aa455) by deleting or substituting several bases except for the
10 base of the 455th position or adding at least one base thereto;

(ca455) a base sequence containing bases of the 441st to 455th positions of the sequence represented by SEQ ID NO:18;

15 (da455) a base sequence containing bases of the 449th to 459th positions of the sequence represented by SEQ ID NO:18;

(ea455) a complementary sequence to a base sequence selected from the base sequences of (aa455) to
20 (da455);

(ac455) a base sequence represented by SEQ ID NO:19;

(bc455) a modified base sequence obtained by modifying the sequence represented by (ac455) by
25 deleting or substituting several bases except for the base of the 455th position or adding at least one base thereto;

(cc455) a base sequence containing bases of the 441st to 455th positions of the sequence represented by SEQ ID NO:19;

5 (dc455) a base sequence containing bases of the 449th to 459th positions of the sequence represented by SEQ ID NO:19;

(ec455) a complementary sequence to a base sequence selected from the base sequences of (ac455) to (dc455);

10 (aa420) a base sequence represented by SEQ ID NO:37\;

(ba420) a modified base sequence obtained by modifying the sequence represented by (aa420) by deleting or substituting several bases except for the
15 base of the 420th position or adding at least one base thereto;

(ca420) a base sequence containing bases of the 415th to 425th positions of the sequence represented by SEQ ID NO:37;

20 (da420) a complementary sequence to a base sequence selected from the base sequences of (aa420) to (ca420);

(ac420) a base sequence represented by SEQ ID NO:38;

25 (bc420) a modified base sequence obtained by modifying the sequence represented by (ac420) by deleting or substituting several bases except for the

base of the 420th position or adding at least one base thereto;

(cc420) a base sequence containing bases of the 415th to 425th positions of the sequence represented by
5 SEQ ID NO:38;

(dc420) a complementary sequence to a base sequence selected from the base sequences of (ac420) to (cc420);

(at420) a base sequence represented by SEQ ID
10 NO:39;

(bt420) a modified base sequence obtained by modifying the sequence represented by (at420) by deleting or substituting several bases except for the base of the 420th position or adding at least one base
15 thereto;

(ct420) a base sequence containing bases of the 415th to 425th positions of the sequence represented by SEQ ID NO:39;

(dt420) a complementary sequence to a base
20 sequence selected from the base sequences of (at420) to (ct420);

(ag420) a base sequence represented by SEQ ID NO:40;

(bg420) a modified base sequence obtained by
25 modifying the sequence represented by (ag420) by deleting or substituting several bases except for the base of the 420th position or adding at least one base

thereto;

(cg420) a base sequence containing bases of the 415th to 425th positions of the sequence represented by SEQ ID NO:40;

5 (dg420) a complementary sequence to a base sequence selected from the base sequences of (ag420) to (cg420);

(ag221) a base sequence represented by SEQ ID NO:41 of the list attached at a later portion in the
10 text;

(bg221) a modified base sequence obtained by modifying the sequence represented by (ag221) by deleting or substituting several bases except for the base of the 425th position or adding at least one base
15 thereto;

(cg221) a base sequence containing bases of the 418th to 432nd positions of the sequence represented by SEQ ID NO:41;

(dg221) a base sequence containing bases of the
20 421st to 430th positions of the sequence represented by SEQ ID NO:41;

(eg221) a complementary sequence to a base sequence selected from the base sequences of (ag221) to (dg221);

25 (ac221) a base sequence represented by SEQ ID NO:42 of the list attached at a later portion in the text;

(bc221) a modified base sequence obtained by modifying the sequence represented by (ac221) by deleting or substituting several bases except for the base of the 425th position or adding at least one base thereto;

(cc221) a base sequence containing bases of the 418th to 432nd positions of the sequence represented by SEQ ID NO:42;

(dc221) a base sequence containing bases of the 421st to 430th positions of the sequence represented by SEQ ID NO:42;

(ec221) a complementary sequence to a base sequence selected from the base sequences of (ac221) to (dc221);

(aa221) a base sequence represented by SEQ ID NO:43 of the list attached at a later portion in the text;

(ba221) a modified base sequence obtained by modifying the sequence represented by (aa221) by deleting or substituting several bases except for the base of the 425th position or adding at least one base thereto;

(ca221) a base sequence containing bases of the 418th to 432nd positions of the sequence represented by SEQ ID NO:43;

(da221) a base sequence containing bases of the 421st to 430th positions of the sequence represented by

SEQ ID NO:43;

(ea221) a complementary sequence to a base sequence selected from the base sequences of (aa221) to (da221);

5 (at221) a base sequence represented by SEQ ID NO: 44 of the list attached at a later portion in the text;

(bt221) a modified base sequence obtained by modifying the sequence represented by (at221) by
10 deleting or substituting several bases except for the base of the 425th position or adding at least one base thereto;

(ct221) a base sequence containing bases of the 418th to 432nd positions of the sequence represented by
15 SEQ ID NO:44;

(dt221) a base sequence containing bases of the 421st to 430th positions of the sequence represented by SEQ ID NO:44;

(et221) a complementary sequence to a base
20 sequence selected from the base sequences of (at221) to (dt221);

(ag54) a base sequence represented by SEQ ID NO: 45 of the list attached at a later portion in the text;

25 (bg54) a modified base sequence obtained by modifying the sequence represented by (ag54) by deleting or substituting several bases except for the

base of the 875th position or adding at least one base thereto;

(cg54) a base sequence containing bases of the 874th to 876th positions of the sequence represented by
5 SEQ ID NO:45;

(dg54) a base sequence containing bases of the 869th to 880th positions of the sequence represented by
SEQ ID NO:45;

(eg54) a complementary sequence to a base sequence
10 selected from the base sequences of (ag54) to (dg54);

(aa54) a base sequence represented by SEQ ID NO: 46 of the list attached at a later portion in the text;

(ba54) a modified base sequence obtained by
15 modifying the sequence represented by (aa54) by deleting or substituting several bases except for the base of the 875th position or adding at least one base thereto;

(ca54) a base sequence containing bases of the 874th to 876th positions of the sequence represented by
20 SEQ ID NO:46;

(da54) a base sequence containing bases of the 869th to 880th positions of the sequence represented by
SEQ ID NO:46;

(ea54) a complementary sequence to a base sequence
25 selected from the base sequences of (aa54) to (da54);

(ac54) a base sequence represented by SEQ ID

NO: 47 of the list attached at a later portion in the text;

(bc54) a modified base sequence obtained by modifying the sequence represented by (ac54) by
5 deleting or substituting several bases except for the base of the 875th position or adding at least one base thereto;

(cc54) a base sequence containing bases of the 874th to 876th positions of the sequence represented by
10 SEQ ID NO:47;

(dc54) a base sequence containing bases of the 869th to 880th positions of the sequence represented by SEQ ID NO:47;

(ec54) a complementary sequence to a base sequence
15 selected from the base sequences of (ac54) to (dc54);

(at54) a base sequence represented by SEQ ID NO: 48 of the list attached at a later portion in the text;

(bt54) a modified base sequence obtained by
20 modifying the sequence represented by (ag54) by deleting or substituting several bases except for the base of the 875th position or adding at least one base thereto;

(ct54) a base sequence containing bases of the 874th to 876th positions of the sequence represented by
25 SEQ ID NO:48;

(dt54) a base sequence containing bases of the

869th to 880th positions of the sequence represented by
SEQ ID NO:48;

(et54) a complementary sequence to a base sequence
selected from the base sequences of (at54) to (dt54);

5 (ag52-57) a base sequence represented by SEQ ID
NO:45 of the list attached at a later portion in the
text;

(bg52-57) a modified base sequence obtained by
modifying the sequence represented by (ag52-57) by
10 deleting or substituting several bases except for the
base of the 875th position or adding at least one base
thereto;

(cg52-57) a base sequence containing bases of the
868th to 885th positions of the sequence represented by
15 SEQ ID NO:45;

(dg52-57) a complementary sequence to a base
sequence selected from the base sequences of (ag52-57)
to (dg52-57);

(aa52-57) a base sequence represented by SEQ ID
20 NO:46 of the list attached at a later portion in the
text;

(ba52-57) a modified base sequence obtained by
modifying the sequence represented by (aa52-57) by
deleting or substituting several bases except for the
25 base of the 875th position or adding at least one base
thereto;

(ca52-57) a base sequence containing bases of the

868th to 885th positions of the sequence represented by
SEQ ID NO:46;

(da52-57) a complementary sequence to a base
sequence selected from the base sequences of (aa52-57)
5 to (ca52-57);

(ac52-57) a base sequence represented by SEQ ID
NO:47 of the list attached at a later portion in the
text;

(bc52-57) a modified base sequence obtained by
10 modifying the sequence represented by (ac52-57) by
deleting or substituting several bases except for the
base of the 875th position or adding at least one base
thereto;

(cc52-57) a base sequence containing bases of the
15 868th to 885th positions of the sequence represented by
SEQ ID NO:47;

(dc52-57) a complementary sequence to a base
sequence selected from the base sequences of (ac52-57)
to (cc52-57);

(at52-57) a base sequence represented by SEQ ID
20 NO:48 of the list attached at a later portion in the
text;

(bt52-57) a modified base sequence obtained by
modifying the sequence represented by (at52-57) by
25 deleting or substituting several bases except for the
base of the 875th position or adding at least one base
thereto;

(ct52-57) a base sequence containing bases of the 868th to 885th positions of the sequence represented by SEQ ID NO:48; and

(dt52-57) a complementary sequence to a base
5 sequence selected from the base sequences of (at52-57) to (dt52-57).

24. The probe-immobilized chip according to claim 18, wherein detection of the presence of the specific nucleic acids is electrochemically performed.

10 25 The probe-immobilized chip according to claim 23, wherein detection of the presence of the specific nucleic acids is electrochemically performed.

26. A method for determining responsiveness to a treatment for a disease of an individual, wherein the
15 disease is associated with the presence of a pathogenic microorganism in the individual, comprising the steps of:

a) reacting an extract of nucleic acids from said individual with a first nucleic acid probe that
20 hybridizes with nucleic acid of the pathogenic microorganism, wherein the pathogenic microorganism is associated with said disease, and a second nucleic acid probe that hybridizes with target nucleic acid of said individual, wherein the target nucleic acid of said
25 individual is associated with responsiveness to a treatment for a disease of an individual; and

b) detecting said nucleic acid of said pathogenic

microorganism that binds to said first nucleic acid probe and said target nucleic acid of said individual that binds to said second nucleic acid probe, wherein the presence of both said nucleic acid of said

5 pathogenic microorganism that binds to said first nucleic acid probe and said target nucleic acid of said individual that binds to said second nucleic acid probe is correlated with responsiveness to a treatment for the disease.

10 27. The method of claim 26, wherein the probes are immobilized on a substrate.

28. The method of claim 26, further comprising the step of amplifying said nucleic acid from said individual prior to reacting in a).

15 29. A method for determining susceptibility of an individual to disease, comprising the steps of

a) reacting an extract of nucleic acid from said individual with a first nucleic acid probe that hybridizes with a nucleic acid of a pathogenic
20 microorganism associated with the disease and a second nucleic acid probe that hybridizes with a target nucleic acid of said individual that is associated with susceptibility to said disease; and

b) detecting said nucleic acid of said pathogenic
25 microorganism that binds to said first nucleic acid probe and said nucleic acid of said individual that binds to said second nucleic acid probe, wherein the

presence of both said nucleic acid of said pathogenic
microorganism that binds to said first nucleic acid
probe and said nucleic acid of said individual that
binds to said second nucleic acid probe is correlated
5 with susceptibility of said individual to said disease.

30. The method of claim 29, wherein the probes are
immobilized on a substrate.

31. The method of claim 29, further comprising the
step of amplifying said nucleic acid from said
10 individual prior to reacting in a).

32. A method of preparing a probe-immobilized
substrate comprising a first probe that detects the
presence of a specific nucleic acid of a pathogenic
microorganism associated with a disease and a second
15 probe that detects the presence of a specific nucleic
acid of an individual that is associated with
responsiveness to a treatment for the disease,
comprising the step of immobilizing the first probe and
the second probe to a substrate.

20 33. The method of claim 32, wherein said substrate
is selected from the group consisting of a base plate,
a porous material, a micro-titer plate, beads,
spherical material, a granular material, a magnetic
material or magnetic beads.